

REMARKS

Claims 2-5 are pending in this application, of which claims 1 and 2 have been amended.

Claim 3 has been canceled. No new claims have been added.

The Examiner has maintained from the previous Office Action the following prior art rejections:

1. Provisional obviousness-type double patenting rejection of claims 1 and 3 as unpatentable over claims 1 and 4 of copending application S.N. 10/046,293 (hereinafter “**293**”);
2. 35 USC §103(a) rejection of claims 1, 3 and 5 as unpatentable over **Masberg et al.**; and
3. 35 USC §103(a) rejection of claims 2 and 4 as unpatentable over **Masberg et al.** in view of **Sturman**.

In Applicants’ previous response dated October 7, 2003, it was argued:

Page 10, lines 1-15 of the specification disclose that “all cylinders deactivated operation” is enabled by both the intake and exhaust valves being closed. It is not a necessary condition that the fuel be stopped. The only requirement is that the valves be closed to perform all cylinder deactivation. Performing the closing of the valves when fuel stoppage occurs during deceleration is one of the inventive aspects of the present invention.

The Examiner has indicated the following:

The examiner maintains that it is obvious to stop the supply of fuel to the engine when the intake and exhaust valves are closed to

prevent a build up of fuel in the cylinder, which would cause a back fire or excessive emissions when the intake and exhaust valves operation is resumed.

Accordingly, a Terminal Disclaimer is attached hereto to overcome the provisional double-patenting rejection.

Masberg et al. discloses that the motor generates regeneration power and the cylinder shut off operation. However, the feature of the present invention that deactivation operation is carried out when the fuel supply is stopped while the vehicle is decelerating is not disclosed. That is Masberg et al. neither disclose nor suggest the characteristic feature of the present invention that when the vehicle is decelerating, regenerative power generation is carried out even though the fuel supply is stopped and the cylinder deactivation is also carried out.

Masberg et al. fails to teach, mention or suggest the limitations in claim 3, which require that both intake and exhaust valves are closed during cylinder deactivation operation. Although column 3, lines 32-33 disclose: "When cylinders are switched off by fuel and perhaps valve shut off ...", there is no disclosure in the rest of the reference of valve shutoff occurring simultaneously with fuel cut-off, as required by claim 3 of the instant application. This suggests that the passage noted above means that fuel cut-off and valve shut-off are alternative ways of switching cylinders off and does not suggest simultaneous use of both operations, as required in claim 3 of the instant application.

Accordingly, claim 3 has been canceled and its limitations added to claim 1.

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Sturman has been cited for teaching a valve position sensor but, like the other cited references, fails to teach, mention or suggest the limitations recited in claim 3, which we recommend adding to claim 1, as noted above.

Thus, the rejections should all be withdrawn and a Notice of Allowance is earnestly solicited.

In view of the aforementioned amendments and accompanying remarks, claims 1-2 and 4-5, as amended, are in condition for allowance, which action, at an early date, is requested.

If, for any reason, it is felt that this application is not now in condition for allowance, the Examiner is requested to contact Applicants undersigned attorney at the telephone number indicated below to arrange for an interview to expedite the disposition of this case.

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In the event that this paper is not timely filed, Applicants respectfully petition for an appropriate extension of time. Please charge any fees for such an extension of time and any other fees which may be due with respect to this paper, to Deposit Account No. 01-2340.

Respectfully submitted,

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PATENT TRADEMARK OFFICE

Enclosures: Terminal Disclaimer
Submission of Terminal Disclaimer

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